WELKOM
IN
WELCOME
TO
STANFORD
FYNBOSROETE
SUIDELIKE OVERBERG
FYNBOS ROUTE
SOUTHERN OVERBERG

Chapter 19: Assessing Key Vulnerabilities and the Risk from Climate Change

Coordinating Lead Authors:
S.H. Schneider (USA), S. Semenov (Russia), A. Patwardhan (India)

Lead Authors:
I. Burton (Canada), C. Magadza (Zimbabwe), M. Oppenheimer (USA), A.B. Pittock (Australia), A. Rahman (Bangladesh), J.B. Smith (USA), A. Suarez (Cuba), F. Yamin (UK)

Contributing Authors:
J. Corfee-Morlot (France), K. Ebi (USA), A. Finkel (USA), H-M. Füssel (Germany), S. Hallegatte (France), K. Keller (Germany), D. MacMynowski (USA), M.D. Mastrandrea (USA), A. Todorov (Bulgaria)

Review Editors:
R. Sukumar (India), J-P. van Ypersele (Belgium), J. Zillman (Australia)

IPCC Fourth Assessment Report (AR4) WGII Timeline

September 2004 – First WGII Lead Author (LA) Meeting, Vienna, Austria:

March 2005 – Second WGII LA Meeting, Cairns, Australia:

September – November 2005 – ZOD Expert Review

January 2006 – Third WGII LA Meeting, Merida, Mexico:

April – June, 2006 – FOD Expert and Government Review

Sept. 2006 – Fourth WGII LA Meeting, Cape Town, South Africa:

December 2006 – February 2007 – Final Government Review of SPM

April 2007 – WGII Plenary, Brussels, Belgium:

IPCC Fourth Assessment Report (AR4) WGII Timeline

September 2004 – First WGII Lead Author (LA) Meeting, Vienna, Austria:

--Plenary-Agreed Outline Approved

March 2005 – Second WGII LA Meeting, Cairns, Australia:

September – November 2005 – ZOD Expert Review

January 2006 – Third WGII LA Meeting, Merida, Mexico:

April – June, 2006 – FOD Expert and Government Review

Sept. 2006 – Fourth WGII LA Meeting, Cape Town, South Africa:

December 2006 – February 2007 – Final Government Review of SPM

April 2007 – WGII Plenary, Brussels, Belgium:

19. Assessing Key Vulnerabilities and the Risk from Climate Change

• Methods and concepts: issues relating to Article 2 of the UNFCCC; reasons for concern; measuring damage; identifying key impacts and vulnerabilities, and their risk of occurrence

• Approaches to determining levels of climate change for key impacts

• Assessing key global risks

• Assessing key risks for regions and sectors

• Assessment of response strategies to avoid occurrence: stabilization scenarios; mitigation/adaptation strategies; avoiding irreversibilities; role of sustainable development; treatment of uncertainty

• Uncertainties, unknowns, priorities for research

IPCC Fourth Assessment Report (AR4) WGII Timeline

September 2004 – First WGII Lead Author (LA) Meeting, Vienna, Austria:

--Plenary-Agreed Outline Approved

March 2005 – Second WGII LA Meeting, Cairns, Australia:

--Zero Order Draft (ZOD) Preparation Begins

September – November 2005 – ZOD Expert Review

January 2006 – Third WGII LA Meeting, Merida, Mexico:

April – June, 2006 – FOD Expert and Government Review

Sept. 2006 – Fourth WGII LA Meeting, Cape Town, South Africa:

December 2006 – February 2007 – Final Government Review of SPM

April 2007 – WGII Plenary, Brussels, Belgium:

IPCC Fourth Assessment Report (AR4) WGII Timeline

September 2004 – First WGII Lead Author (LA) Meeting, Vienna, Austria:

--Plenary-Agreed Outline Approved

March 2005 – Second WGII LA Meeting, Cairns, Australia:

--Zero Order Draft (ZOD) Preparation Begins

September – November 2005 – ZOD Expert Review

January 2006 – Third WGII LA Meeting, Merida, Mexico:

--Responses to Expert Reviews Prepared

--First Order Draft (FOD) Preparation Begins

April – June, 2006 – FOD Expert and Government Review

Sept. 2006 – Fourth WGII LA Meeting, Cape Town, South Africa:

--Responses to Expert and Government Reviews Prepared

--Final Government Draft (FGD) Preparation Begins

December 2006 – February 2007 – Final Government Review of SPM

April 2007 – WGII Plenary, Brussels, Belgium:

IPCC Fourth Assessment Report (AR4) WGII Timeline

September 2004 – First WGII Lead Author (LA) Meeting, Vienna, Austria:

--Plenary-Agreed Outline Approved

March 2005 – Second WGII LA Meeting, Cairns, Australia:

--Zero Order Draft (ZOD) Preparation Begins

September – November 2005 – ZOD Expert Review

January 2006 – Third WGII LA Meeting, Merida, Mexico:

--Responses to Expert Reviews Prepared

--First Order Draft (FOD) Preparation Begins

April – June, 2006 – FOD Expert and Government Review

Sept. 2006 – Fourth WGII LA Meeting, Cape Town, South Africa:

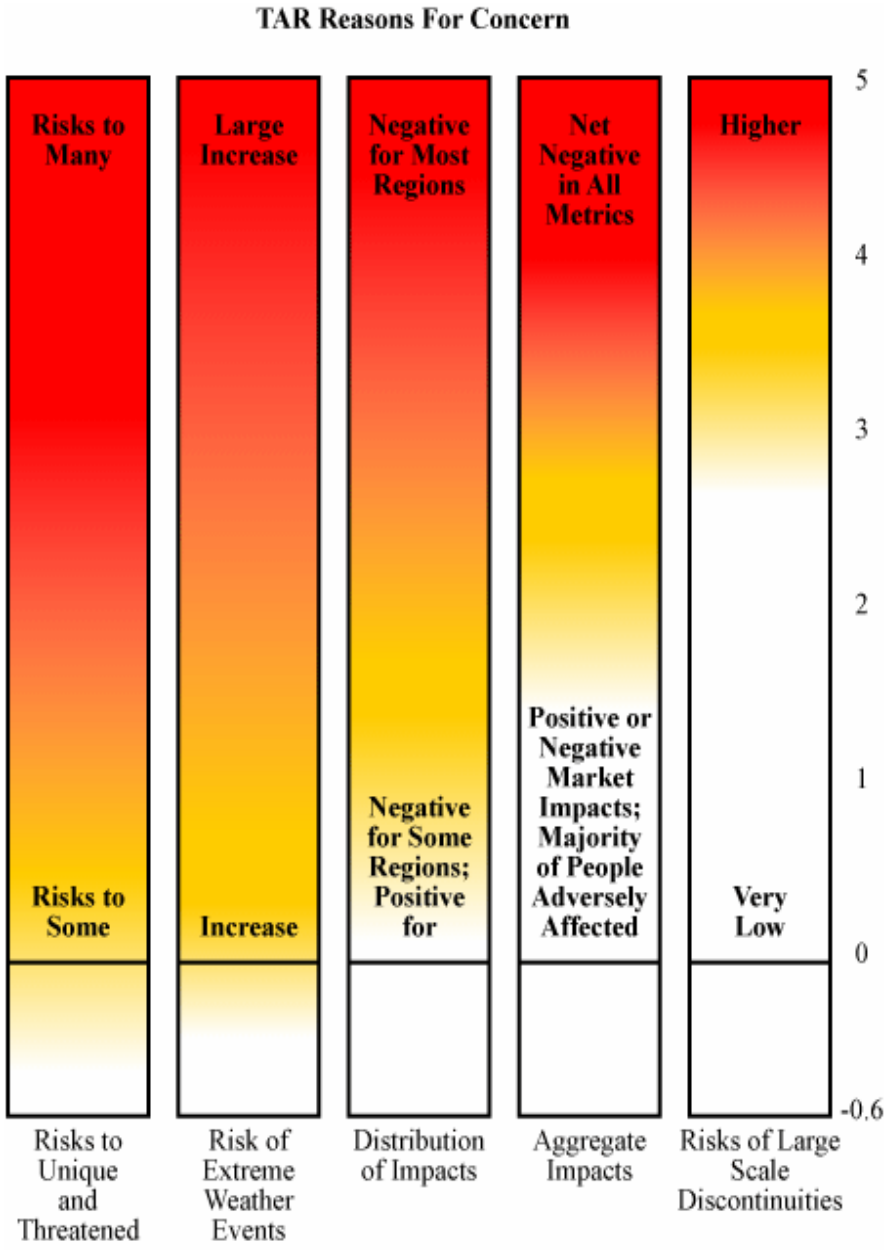
--Responses to Expert and Government Reviews Prepared

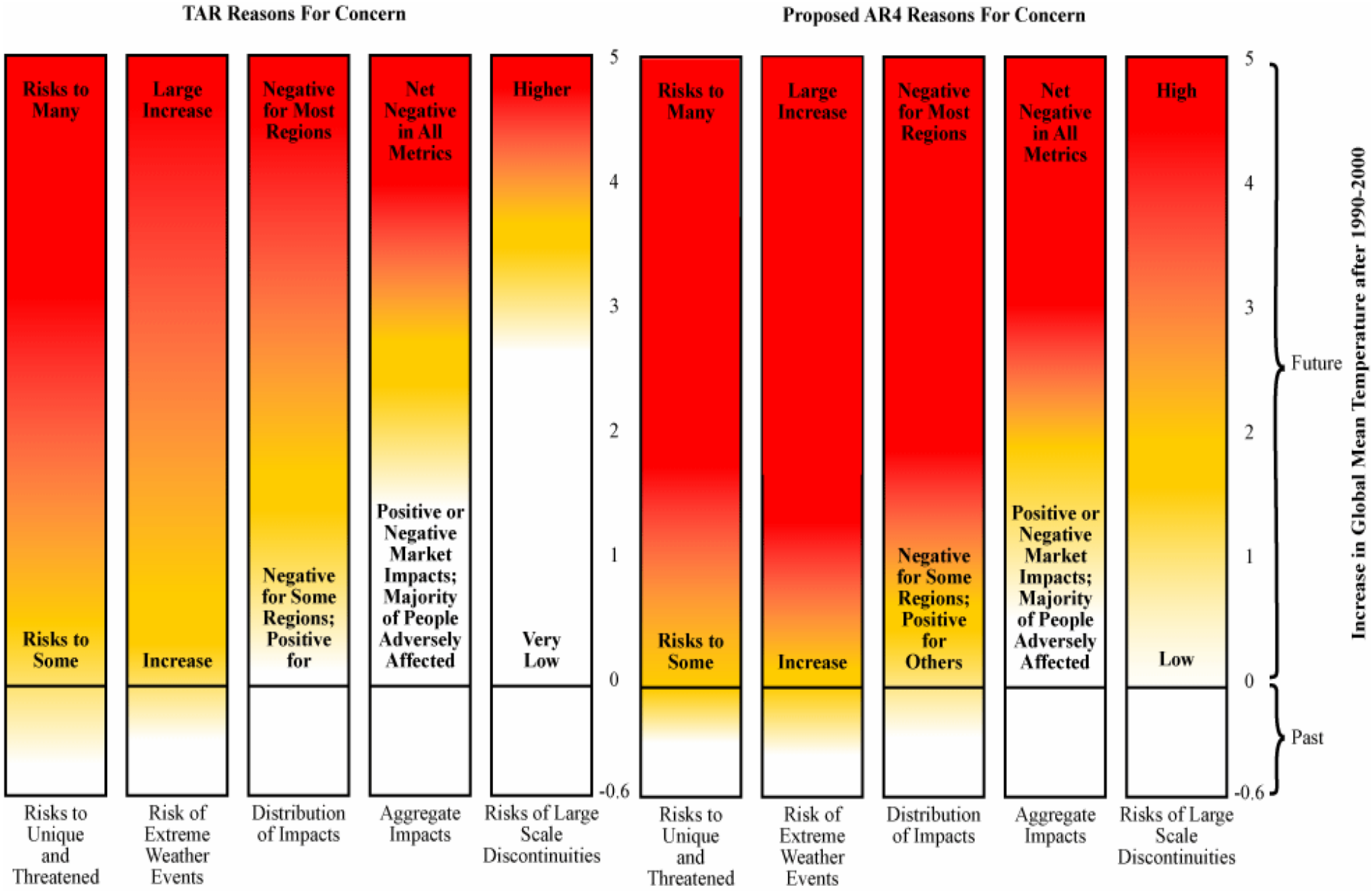
--Final Government Draft (FGD) Preparation Begins

December 2006 – February 2007 – Final Government Review of SPM

April 2007 – WGII Plenary, Brussels, Belgium:

--SPM Approved and Released


TAR Reasons For Concern
Risks to Many
Risks to Some
Large Increase
Increase
Negative for Most Regions
Negative for Some Regions; Positive for
Net Negative in All Metrics
Positive or Negative Market Impacts; Majority of People Adversely Affected
Higher
Very Low
5
4
3
2
1
0
-0.6
Risks to Unique and Threatened
Risk of Extreme Weather Events
Distribution of Impacts
Aggregate Impacts
Risks of Large Scale Discontinuities


TAR Reasons For Concern
Proposed AR4 Reasons For Concern
Risks to Many
Risks to Some
Large Increase
Increase
Negative for Most Regions
Negative for Some Regions; Positive for
Net Negative in All Metrics
Positive or Negative Market Impacts; Majority of People Adversely Affected
Higher
Very Low
High
Low
Negative for Some Regions; Positive for Others
5
4
3
2
1
0
-0.6
Future
Past
Increase in Global Mean Temperature after 1990-2000
Risks to Unique and Threatened
Risk of Extreme Weather Events
Distribution of Impacts
Aggregate Impacts
Risks of Large Scale Discontinuities